

Recombinant Human EIF4EBP1

Catalog No: C200

Description	Recombinant Human Eukaryotic Translation Initiation Factor 4E-Binding Protein 1 is produced by our E.coli expression system and the target gene encoding Met1-Ile118 is expressed with a 6His tag at the N-terminus.
Expression System	E.coli
Alternative name	Eukaryotic Translation Initiation Factor 4E-Binding Protein 1; 4E-BP1; eIF4E-Binding Protein 1; Phosphorylated Heat- and Acid-Stable Protein Regulated by Insulin 1; PHAS-I; EIF4EBP1
Accession No.	Q13541
Predicted Molecular Weight	84.63kDa
Apparent Molecular Weight	103kDa, reducing conditions.
Quality Control	Purity: greater than 95% as determined by reducing SDS-PAGE. Endotoxin: less than 0.1 ng/μg (1 EU/μg) as determined by LAL test.
Formulation	Lyophilized from a 0.2 μm filtered solution of 20mM PB, 150mM NaCl, pH 7.4.
Reconstitution	It is not recommended to reconstitute to a concentration less than 100μg/ml. Dissolve the lyophilized protein in distilled water. Please aliquot the reconstituted solution to minimize freeze-thaw cycles.
Shipping	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature listed below.
Storage	Lyophilized protein should be stored at < -20°C, though stable at room temperature for 3 weeks. Reconstituted protein solution can be stored at 4-7°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months. Always centrifuge tubes before opening. Do not mix by vortex or pipetting.
Background	Eukaryotic Translation Initiation Factor 4E-Binding Protein 1 (4EBP1) is a member of the eIF4E-binding protein family. 4EBP1 regulates eIF4E activity by preventing its assembly into the eIF4F complex. 4EBP1 mediates the regulation of protein translation by hormones, growth factors and other stimuli that signal through the MAP kinase and mTORC1 pathways. Non-phosphorylated 4EBP1 competes with EIF4G1/EIF4G3 to interact with EIF4E. 4EBP1 is phosphorylated in response to various signals including insulin signaling, resulting in its dissociation from eIF4E and activation of mRNA translation. 4EBP1 has a role in progression of breast neoplasms through cell signaling.

SDS-PAGE

